



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/698,668	10/31/2003	Robert Ledingham	6486.P003	1021

7590 01/04/2007
James C. Scheller, Jr.
BLAKELY, SOKOLOFF, TAYLOR & ZAFMAN LLP
Seventh Floor
12400 Wilshire Boulevard
Los Angeles, CA 90025-1026

EXAMINER	
LEE, WILSON	
ART UNIT	PAPER NUMBER
2163	

SHORTENED STATUTORY PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE
3 MONTHS	01/04/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

Office Action Summary

Application No.

10/698,668

Applicant(s)

LEDINGHAM ET AL.

Examiner

Wilson Lee

Art Unit

2163

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 03 November 2006.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-31 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-31 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____

Response to Arguments

In response to applicant's argument that the prior art fails to disclose the database is for an air traffic use, a recitation of the intended use of the claimed invention must result in a structural difference between the claimed invention and the prior art in order to patentably distinguish the claimed invention from the prior art. If the prior art structure is capable of performing the intended use, then it meets the claim.

Claim Rejections – 35 U.S.C. 112

The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention; and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

Claims 1-31 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the enablement requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to enable one skilled in the art to which it pertains, or with which it is most nearly connected, to make and/or use the invention.

In Claims 1, 14, 28, "one-way transfer" has not been taught in the specification to enable one skilled in the art to make/use the invention.

In claim 31, "denormalizing" has not been taught in the specification to enable one skilled in the art to make/use the invention.

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Art Unit: 2163

Claims 9, 12, 13 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Regarding Claim 9, "Open Database Connectivity" is not understood and defined what it is.

Regarding Claim 12, "the gateway database server" lacks antecedent basis.

Claim Rejections – 35 U.S.C. 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claims 1, 2, 5, 8-11, 14-16, 19, 22-24, 27-31 are rejected under 35 U.S.C. 102(e) as being anticipated by Dick et al. (7,039,034).

Regarding Claim 1, Dick discloses database architecture for an air traffic information display system (See Col. 9, lines 52-65) comprising:

- a data manager (TCP/IP) including a first interface (layer) (See Col. 14, line 62 to Col. 15, line 64);

Art Unit: 2163

- a first database server (514) connected to the data manager via the first interface, and receiving data from the data manager (See Col. 14, line 62 to Col. 15, line 64);
- a firewall (See Figure 5) connected to the first database server (514);
- a second database server (another server that connects the laptop 508 or PC 510) connected to the first database server via the firewall and including a stored procedure for copying the data from the first database server (See Figure 5); and
- a data transfer link (being encrypted) for implementing a one-way transfer of the data between the first database server and the second database server through the firewall using the stored procedure to prevent the data in the first database server from being corrupted by a user of the system (See Col. 15, line 65 to Col. 16, line 18 and line 48 to Col. 17, line 21).

Regarding Claim 2, Dick discloses that the first database server includes first tables for current data (See Col. 9, line 52 to Col. 10, line 13) and second tables for logging changes to the current data, and wherein the changes are transferred to the second database server using the stored procedure (algorithm) (See Col. 18, lines 13-25).

Regarding Claim 5, Dick discloses that the first tables include a system table (inherent feature that is able to work with the system).

Regarding Claim 8, Dick discloses that the second tables include a system table (inherent feature that is able to work with the system).

Art Unit: 2163

Regarding Claim 9, Dick discloses that the first interface is an Open Database Connectivity (interpreted as a connection) (See Col. 1, line 56 to Col. 2, line 20; Col. 4, lines 11-45).

Regarding Claim 10, Dick discloses that the second database server includes third tables for receiving updates from the second tables (inherently comprises tables in various layers for transferring data to database of the libraries/classes) (Also see Col. 10, lines 29 to Col. 11, lines 43).

Regarding Claim 11, Dick discloses that the second database server includes fourth tables for logging copies of the third tables (inherently comprises tables in various layers for transferring data to database of the libraries/classes) (Also see Col. 10, lines 29 to Col. 11, lines 43).

Regarding Claim 14, Dick discloses a method of storing air traffic information (See Col. 9, lines 52-65) comprising:

- receiving a data update request; (See Figures 1, 2, 5; Col. 14, line 62 to Col. 15, line 64);
- changing the data in accordance with the request (See Col. 9, line 52 to Col. 10, line 13);
- storing the changed data in a first database server (514) (See Col. 13, lines 54-67; Col. 14, line 62 to Col. 15, line 64 and Figure 6); and
- copying the changed data to a second database server (another server that connects the laptop 508 or PC 510) separated from the first database server (514) by a firewall (See Figure 5), including implementing , a one-way transfer of the changed data between the

first database server and the second database server through the firewall using a stored procedure in the second database server to prevent (by being encrypted) the changed data in the first database server from being corrupted by a user. (See Col. 15, line 65 to Col. 16, line 18 and line 48 to Col. 17, line 21).

Regarding Claim 15, Dick discloses that the storing includes storing the changed data in first tables (See Col. 13, lines 54-67; Col. 18, lines 13-25 and Figure 6).

Regarding Claim 16, Dick discloses that the storing includes storing a log of data change transactions in second tables. (See Col. 13, lines 54-67; Col. 18, lines 13-25 and Figure 6).

Regarding Claim 19, Dick discloses that the first tables include a system table (inherent feature that is able to work with the system).

Regarding Claim 22, Dick discloses that the second tables include a system table (inherent feature that is able to work with the system).

Regarding Claim 23, Dick discloses that the copying includes storing updates from the second tables in third tables. (inherently comprises tables in various layers for transferring data to database of the libraries/classes) (Also see Col. 10, lines 29 to Col. 11, lines 43).

Regarding Claim 24, Dick discloses that the copying includes logging copies of the third tables in fourth tables (inherently comprises tables in various layers for transferring data to database of the libraries/classes) (Also see Col. 10, lines 29 to Col. 11, lines 43).

Art Unit: 2163

Regarding Claim 27, Dick discloses that the second table is populated by a trigger, and wherein one or more than one row associated with the changes is inserted into the second table when the changes are made to the first table. (rows are inherent features in all tables) (Also see Col. 18, lines 13-25).

Regarding Claim 28, Dick discloses that the stored procedure is run by a scheduled Job by which the one-way transfer of the data is implemented periodically. (See Col. 15, line 65 to Col. 16, line 18 and line 48 to Col. 17, line 21).

Regarding Claim 29, Dick discloses that the storing includes storing to changed data into a first table in the first database server, and populating a second table in the first database server to insert on a or more than one row associated with the change into the second table (rows are inherent features in tables) (Also see Col. 15, line 65 to Col. 16, line 18 and line 48 to Col. 17, line 21; Col. 18, lines 13-25).

Regarding Claim 30, Dick discloses that the implementing includes running the stored procedure by a scheduled job (job done by server) to periodically implement the one-way transfer of the changed data. (See Col. 15, line 65 to Col. 16, line 18 and line 48 to Col. 17, line 21; Col. 18, lines 13-25).

Regarding Claim 31, Dick discloses that the storing includes de-normalizing tables in the first database server (See Col. 13, lines 35-67).

Claim Rejections – 35 U.S.C. 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

Art Unit: 2163

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 3, 4, 6, 7, 12, 13, 17, 18, 20, 21, 25, 26 are rejected under 35

U.S.C. 103(a) as being unpatentable over Dick et al. (7,039,034).

As discussed above, Dick essentially discloses the claimed invention but does not explicitly disclose what kind of data or information is being used in the invention such as flight data, airport and movement. However, Dick teaches that the system is used for an aircraft in air-traffic control system, and the data can be any user-defined data types such as time, angles, and complex numbers or points on the plane or just anything in the real world (See Col. 9, line 52 to Col. 10, line 3). It would have been obvious to one skilled in the art to understand Dick's invention is capable of storing and using any data including flight, airport, movement or even speed, aircraft location, gasoline level, or any other information about the aircraft as implied and taught by Dick in order to accurately control the air-traffic.

Conclusion

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is

Art Unit: 2163

filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Gecht et al. (US 2004/0185882) discloses a method and apparatus for providing universal print services and asynchronous message services. Fitzpatrick et al. (US 2002/0193997) discloses a system, method and computer program product for dynamic billing using tags in a speech recognition framework. Berson et al. (7,051,199) discloses a system, method and article of manufacture for providing cryptographic services utilizing a network. Berson et al. (6,990,468) discloses a system and method and article of manufacture for crypto-server based auction.

Correspondence

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Examiner Wilson Lee whose telephone number is (571) 272-1824.

Papers related to the application may be submitted by facsimile transmission. Any transmission not to be considered an official response must be clearly marked "DRAFT". The official fax number is (571) 273-8300.

Art Unit: 2163

Information regarding the status of an application may be obtained from the Patent Application Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

A handwritten signature in black ink, appearing to read 'Wilson Lee', is written over a horizontal line.

Wilson Lee
Primary Examiner
U.S. Patent & Trademark Office

12/26/06